

Criterion E – Processing Data

Table below shows the descriptors and indicators for Criterion E – Processing Data

Level	Descriptor	Indicator
0	The student does not reach a standard described by any of the descriptors below.	The student does not reach a standard described by any of the indicators below.
1 - 2	<p>The student collects some data and attempts to record it in a suitable format.</p> <p>The student organizes and presents data using simple numerical or visual forms.</p> <p>The student attempts to identify a trend, pattern or relationship in the data.</p> <p>The student attempts to draw a conclusion but this is not consistent with the interpretation of the data.</p>	Data is recorded as sentences and not in a table. <i>e.g. worms moved 3cm when....</i>
		Observation has been recorded but it is not understandable or relevant to the aim.
		At least one trend, pattern or relationship from the data is identified but is incorrect.
		Attempts to draw a conclusion but this is not relevant to the data collected.
3 - 4	<p>The student collects sufficient relevant data and records it in a suitable format.</p> <p>The student organizes, transforms and presents data in numerical and/or visual forms, with a few errors or omissions.</p> <p>The student states a trend, pattern or relationship shown in the data.</p> <p>The student draws a conclusion consistent with the interpretation of the data.</p>	At least 3 data points (dependent variable) are collected
		Data is recorded in an appropriate table. <i>By appropriate, I mean it has rows and columns</i>
		Table has understandable headings but one of heading is wrongly written.
		Graph drawn fills almost half a page. <i>So I don't have to strain my eyes to assess your graph</i>
		At least one of the axes (either x or y axis) has been correctly labeled.
		Attempt to title the drawn table and the graph. <i>e.g. The table/graph below shows.....</i>
		Trend, pattern or relationship from the observation, table or graph are correctly stated <i>e.g. When p increases, d increases/decreases</i>
		Conclusion drawn is consistent with the stated trend, pattern and relationship. <i>e.g. my results showed that the worm is afraid/moved away/moved into/... when....</i>

5 - 6	<p>The student collects sufficient relevant data and records it in a suitable format.</p> <p>The student organizes, transforms and presents data in numerical and/or visual forms logically and correctly.</p> <p>The student describes a trend, pattern or relationship in the data</p> <p>The student draws a clear conclusion based on the correct interpretation of the data and explains it using scientific reasoning.</p>		At least 3 data points (dependent variable) are collected
			Data is clearly recorded in an appropriate table. <i>By appropriate, I mean it has rows and columns</i>
			Headings in the table are clearly written, relevant to the data collected and has units of measurement correctly identified <i>e.g. distance – cm, time – second or s</i>
			Graph drawn fills almost half a page (so I don't have to strain my eyes to assess your graph) and is appropriately spaced out (I mean the gap between bars or data points)
			Both x and y-axes have been correctly labeled.
			Table and the graph are correctly and clearly labeled <i>E.g. The table/graph below shows.....</i>
			Trend, pattern or relationship from the observation, table or graph are correctly described <i>e.g. when p (x axis) increases, d (y axis) increases/decreases exponentially/greatly/gradually/erratically</i>
			Conclusion drawn is consistent with the described trend, pattern and relationship. <i>e.g. my results showed that the worm is afraid/moved away/moved into/... when....</i>
			Conclusion drawn is supported by logical and clearly written scientific explanation, concepts or reasoning. <i>Suggested relevant concepts – adaptation, habitat, predator-prey relationship, humidity, heat</i> <i>e.g. this is because the worm was.../the worm is a.... and therefore...</i>